



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/019,753	03/05/2002	Yukihiko Yamashita	TOYAM83.001 APC	7668
20995	7590	03/16/2004	EXAMINER	
KNOBBE MARTENS OLSON & BEAR LLP 2040 MAIN STREET FOURTEENTH FLOOR IRVINE, CA 92614				LEE, RIP A
ART UNIT		PAPER NUMBER		
		1713		

DATE MAILED: 03/16/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/019,753	YAMASHITA ET AL.	
	Examiner Rip A. Lee	Art Unit 1713	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM
THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on November 20, 2003.
 2a) This action is **FINAL**. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1,2 and 4-30 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
 5) Claim(s) 8-18 and 23-30 is/are allowed.
 6) Claim(s) 1,2,4-6 and 19-21 is/are rejected.
 7) Claim(s) 22 is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
 Paper No(s)/Mail Date _____.
- 4) Interview Summary (PTO-413)
 Paper No(s)/Mail Date. _____.
 5) Notice of Informal Patent Application (PTO-152)
 6) Other: _____.

DETAILED ACTION

This office action follows a response filed on October 27, 2003. Claims 1, 2, 7, 13, and 22 were amended to correct matters of form. Amendments to the specification, filed on November 20, 2003, have been entered.

The indicated allowability of claim 3 has been withdrawn. The subject matter of claim 3 has been incorporated into present claim 1. New rejections follow.

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

4. Claims 1, 4, and 6 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over JP 11-246733.

The prior art discloses a composition comprising an isobutylene-based block copolymer and a thermoplastic resin. The block copolymer contains a vinyl aromatic block prepared from indene derivatives (abstract). The ratio of block copolymer to thermoplastic resin is 99:1-1:99 (claim 6). The number average molecular weight of the block copolymer lies in the range of 30,000-500,000 (claim 10). The thermoplastic resin is variegated and includes polystyrene (claim 16). The reference is silent with respect to the water absorptive and optical (birefringent) properties. However, in view of the fact that the prior art material has essentially the same composition as that presently claimed, a reasonable basis exists to believe that the prior art material also exhibits the same properties.[†] Since the PTO can not conduct experiments, the burden of proof is shifted to the Applicants to establish an unobviousness difference. *In re Fitzgerald*, 619 F.2d. 67, 205 USPQ 594 (CCPA 1980). See MPEP § 2112-2112.02.

[†] Products of identical chemical composition can not have mutually exclusive properties. A chemical composition and its properties are inseparable. Therefore, if the prior art teaches the identical chemical structure, the properties applicant discloses and/or claims are necessarily present. *In re Spada*, 911 F.2d 705, 709, 15 USPQ 1655, 1658 (Fed. Cir. 1990).

5. Claims 1, 6, and 19 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over U.S. Patent No. 4,066,717 to Li *et al.*

Li *et al.* teaches a composition comprising 100 pw of polystyrene and 1-50 pw of polyindene (claim 1). Test specimens (1/8" test bars) were molded from the blend (col. 2, line 19). With respect to claim 19, intended use must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim. See MPEP § 2111.02. There is no indication that the composition of the prior art can not be made into the claimed articles of manufacture. As such, the composition still meets the claims. The reference is silent with respect to the water absorptive and optical (birefringent) properties. However, in view of the fact that the prior art material has essentially the same composition as that presently claimed, a reasonable basis exists to believe that the prior art material also exhibits the same properties.[†] Since the PTO can not conduct experiments, the burden of proof is shifted to the Applicants to establish an unobviousness difference. *In re Fitzgerald*, 619 F.2d. 67, 205 USPQ 594 (CCPA 1980). See MPEP § 2112-2112.02.

6. Claims 1, 4-6, and 19-21 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over JP 10-231403.

The patent teaches a composition comprising 10 pw of an aromatic resin having a molecular weight of 100,000-600,000 and 0.1-30 pw of the hydrogenation product of a petroleum resin obtained by polymerizing the fraction containing vinyltoluene and indene. The latter component has a molecular weight that lies in the range of 500-10,000 (abstract). Molded

parts such as sheet and film are made from the inventive composition (see paragraph [0001]). With respect to the recitation “optical parts” in claim 20, intended use must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim. Finally, the reference is silent with respect to the water absorptive and optical (birefringent) properties. However, in view of the fact that the prior art material has essentially the same composition as that presently claimed, a reasonable basis exists to believe that the prior art material also exhibits the same properties.[†] Since the PTO can not conduct experiments, the burden of proof is shifted to the Applicants to establish an unobviousness difference. *In re Fitzgerald*, 619 F.2d. 67, 205 USPQ 594 (CCPA 1980). See MPEP § 2112-2112.02.

7. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over JP 11-246733, Li *et al.*, or JP 10-231403, above, in view of U.S. Patent No. 4,432,607 to Levy.

The references do not recite use of phenolic antioxidants. However, these materials and their use are well established in the chemical art. For example, Levy discloses a composition stabilized with a commercially available hindered phenolic antioxidant, Irganox 1010 (see Table II). One having ordinary skill in the art would have found it obvious to stabilize product resins against oxidation since this is routine practice in the art. Since this routine practice is also exemplified in Levy *et al.*, the skilled artisan would have expected use of phenolic antioxidant to stabilize the cited prior art compositions successfully.

8. Claims 22 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The subject matter of the claim is allowable since none of the cited references teaches optical components. Based on the disclosures alone, the skilled artisan would not have found it obvious to make an optical part using the prior art compositions.

9. As indicated previously, the subject matter of claims 7 and 13 is allowed over the prior art. Consequently, dependent claims 8-12, 14-18, and 23-30 are also allowed.

10. The rejection of claims 1 and 2 under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 4,432,607 to Levy has been withdrawn.

11. The prior art made of record but not relied upon is considered pertinent to the Applicant's disclosure. The following references relate to compositions comprised of a polymer containing indene units and those with polymer containing styrene units.

U.S. Patent No. 6,265,478 to Kralevich *et al.*

U.S. Patent No. 6,228,944 to Blok *et al.*

U.S. Patent No. 5,753,775 to Beckmann *et al.*

U.S. Patent No. 4,603,186 to Wu *et al.*

U.S. Patent No. 4,195,135 to Li *et al.*

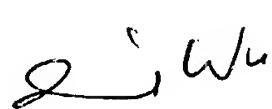
U.S. Patent No. 3,888,941 to Weaver

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rip A. Lee whose telephone number is (571)272-1104. The examiner can be reached on Monday through Friday from 9:00 AM - 5:00 PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu, can be reached at (571)272-1114. The fax phone number for the organization where this application or proceeding is assigned is (703)872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <<http://pair-direct.uspto.gov>>. Should you have questions on the access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll free).

ral

March 5, 2004


DAVID W. WU
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 1700